10. Sofia

Program Name: Sofia.java Input File: sofia.dat

Sofia (who you met while on vacation with your friend Rodrigo), is going on vacation, and needs to find out if she can get from certain cities to certain other cities with the amount of money she has saved for her traveling. You will be given the prices to fly between two cities, and then two cities and an amount of money. You need to write a program to determine if that is enough money to fly between the two given cities. You need to determine the shortest path from the starting to the ending city, and find out if the amount of money Sofia has will be enough to get between the two cities.

Input: The input will begin with two integers, f, denoting the number of flights between 2 cities listed, and n, denoting the number of test cases. The next f lines will each contain 2 strings and an integer, all separated by spaces, denoting the names of the two cities and the price of the flight in either direction, respectively. The following n lines will each contain a test case, containing two strings and an integer, denoting the starting city and ending city, and the amount of money Sofia has to get from the starting to the ending city.

Output: For each test case, if there is enough money to get from the starting city to the ending city output the string "[The name of the ending city] is always a good idea.". Otherwise, output "There's no place like home.".

Sample input:

6 2
Paris Dallas 1200
Paris Prague 650
Prague Munich 300
Paris Munich 300
Berlin Prague 400
Berlin Dallas 2300
Dallas Prague 1550
Dallas Berlin 2200

Sample output:

There's no place like home. Berlin is always a good idea.